DOCUMENT RESUME

ED 196 292 FL 012 059

AUTHOR Berman, Ruth Aronson
TITLE Contrastive Analysis Revisited: Obligatory, Systematic, and Incidental Differences Between Languages.
INSTITUTION Utrecht State Univ., The Netherlands.
PUB DATE 78
NOTE 23p.: Paper delivered at World Congress of Jewish Studies (7th, Jerusalem, August, 1977): Not available in paper copy due to marginal legibility of the original.
JOURNAL CIT Interlanguage Studies Bulletin-Utrecht; v3 n2 p212-33 1978

EDRS PRICE MF01 Plus Postage. PC Not Available from EDRS.
DESCRIPTORS *Contrastive Linguistics: English: Hebrew: Higher Education: *Language Patterns: Language Research: Language Typology: *Language Universals: *Models: Morphology (Languages): Phonology: *Second Language Instruction: Structural Analysis (Linguistics): Syntax: *Teaching Methods

ABSTRACT

Contrastive analysis is suggested as a tool in language teaching for such areas as: (1) deciding how much to focus on different aspects of the target language; (2) making generalizations about its structure; and (3) explaining texts or constructions which might otherwise be incomprehensible. The claim is made that such procedures need to be based on a motivated model of how different languages can be compared both in linguistic theory and in pedagogical application. Thus, both differences and commonalities between two languages need to be related to systematic properties of each, in terms of their overall structure and functioning. Two noncognate languages such as Hebrew and English can be compared along the following diameters: (1) as manifesting obligatory similarities in the form of linguistic universals; (2) as having certain typological or other, nongenetically motivated similarities; (3) as differing in ways attributable to their distinct genetic origins; (4) as differing in other, systematic ways; and (5) as differing due to incidental, idiosyncratic properties typical of nonrule-bound features of any language. The relevance of these claims, illustrated by reference to properties of modern Hebrew and English, is then considered in relation to linguistic theory and language typology, on the one hand, and to the role of contrastive analysis in language pedagogy, on the other. (Author/AMH)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

Interlanguage Studies Bulletin - Utrecht
Vol. 3, No. 2, 1978

ED1962292

CONTRASTIVE ANALYSIS REVISITED
OBLIGATORY, SYSTEMATIC, AND INCIDENTAL DIFFERENCES BETWEEN LANGUAGES

with Specific Reference to the Structures of

Modern Hebrew and English

Ruth Aronson Berman

Department of Linguistics
Tel Aviv University, Israel

1. Introduction

In one of the pendulum swings common in language pedagogy, as in the field of education at large, the area known as 'contrastive analysis' has become largely discredited. The present discussion will not consider the reasons (in part justified) for why contrastive analysis has fallen into disfavour and hence disuse, nor how it has been widely replaced by an upsurge in error analysis. Rather, we attempt (i) to suggest certain areas in which contrastive analysis apriori, in the sense in which this term is used, for instance, by Schachter 1974, might be of relevance to language pedagogy - Section 1.1; and we attempt to show how, for this to be possible, a more adequate linguistic theory of contrastive analysis needs to be explored - Section 1.2. We then proceed (ii) to outline a possible model for comparing and contrasting languages, with specific reference to differences and similarities between Modern Hebrew and English - Section 2.

FL012059

1.1 Contrastive Analysis in Language Pedagogy

Consider, firstly some of the ways in which a judicious comparison of the student's source and target languages might be of help in cases where language learning takes place either partly or entirely within a formal setting.

a) In constructing a course of study, points at which the source language differs in some significant sense from the target (the main aim of the present discussion being precisely to elucidate this notion of "differing significantly", as considered in Section 2) are relevant in deciding on relative emphasis - both for presentation and practice of new material. The focal core of the course of study should, of course, be

U S DEPARTMENT OF HEALTH, EDUCATION & WELFARE
NATIONAL INSTITUTE OF EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

212-
2

"PERMISSION TO REPRODUCE THIS MATERIAL IN MICROFICHE ONLY HAS BEEN GRANTED BY

Ruth A. Berman

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

the target language -in terms of which major decisions will be made regarding what to teach how, when, and why. Yet the relative amount of time to be spent on any given item or set of items, how much explaining is necessary, may be decided by reference to the source language. For example, in accounting for the relationship between propositions expressing possession and various forms of genitive construction (such as apostrophe 's in English or construct-state noun compounds in Hebrew), decisions will be made according to one's analysis of the target language; but more time and attention is needed for handling possessive constructions with students learning a habere language like English or French just in case their own language has no "habere" verb of its own - like Hebrew. And for students who do have some notion of a main verb of "having" in their language, the idea that possession can be expressed through some kind of locative or existential marker - as in Hebrew or Russian - needs special care and explanation[1].

b) Secondly, contrastive analysis can and should be used for purposes of explanation and presentation. If one accepts, as I do, the importance of "explicit teaching"[2] - certainly in the adult learners' classroom - overt reference to the source language and how it compares with the target offers an excellent explanatory device. Consider, for instance the following expressions in Hebrew, all taking the form of a head noun followed by a passive form of the benoni (literally 'medial') semi-nominal present-tense construction[3] - each set listed in a different verb conjugation:

(1) a.	lexem parus	b. nusax mekucar	c. siyur mudrax
	sliced bread	shortened version	guided tour
	rexuš ganuv	šetax megudar	mabat mutrad
	stolen property	fenced-in area	worried look
	xalon šavur	tapuz mekulaf	kol muklat
	broken window	peeled orange	recorded voice

It surely makes sense to explain to learners of European background the relative productivity of such morphologically diverse expressions in terms of the notion "participle" or "verb functioning as an adjective" as in their English counterparts. Another example: In order to get students whose own language has no overtindefinite marker corresponding to English a/an to appreciate the semantically neutral function of this form as a syntactic marker of a given type of noun, one might ask Hebrew-speaking students, say, to do the following kind of task:

nt Street, Arlington, Virginia 22209

(2) Translate the underlined expressions below into Hebrew. What additional word is there in English that is not needed in Hebrew?

> The other day I saw a man who was painting a picture of a little girl with a red balloon. A woman was standing beside him, holding a dog with a curly tail...

(c) A third, relatively neglected, area in which contrastive analysis might be useful is in aiding students to understand unfamiliar material in the new language. Too much emphasis seems to have been placed in the past on the source language for purposes of correct, error-free production rather than for comprehension. Thus consider a sentence such as the following (from: Robert Graves' I, Claudius, Vol.1, Penguin Books 1934, page 79):

(3) Gaius, flattered at the chance of being magnanimous, undertook to forward a letter to Rome asking Augustus's permission for Tiberius to return there, and to endorse it with his own personal recommendation.

For the Hebrew speaker, there is considerable potential difficulty to an appositive expression such as the one concerning Gaius, which in Hebrew would be rendered literally as: "that flattered (Fem.Sing.) to him the chance (Fem. Sing.) to be magnanimous" ; this, combined with many differences in pronominal reference and anaphor in English and Hebrew, and the fact that the elliptical "asking" of the second line would be rendered in Hebrew by something like "that in it will be requested", make some awareness of the student's own syntactic frame of reference very helpful in unraveling potential sources of difficulty in understanding such complex texts.

(d) Next, it seems that contrastive analysis might be used more widely outside of the areas in which it has most typically been applied - phonology and morpho-syntax. We refer to the lexicon, where careful contrastive analysis might perhaps be of the most immediate help to the foreign learner: in deciding which lexical items need special attention in the course of study (as discussed in (a) above); in explicating meanings; and in providing better tools for understanding in the target language. Consider the relative complexities of such everyday words as the following:

(4) a. xor, bor, nekev, 'hole': xor being the least marked term, bor referring to any hole which is dug out, nekev to a hole which is pierced through

b. kise, kursa 'chair': kursa being used for any chair which has arms and is also upholstered

c. kir, xoma 'wall' xoma referring to a wall which surrounds something such as a city, a house, or a garden

(5) a. passenger, traveler: rendered by a single agent-noun nosea in Hebrew

b. expert, specialist: both are rendered by mumxe in Hebrew, but they relate to different abstract nouns - mumxiyut 'expertise' and hitmaxut 'specialization' - all being derived from a single consonantal root

c. offer, suggest, propose: all are rendered by the single Hebrew verb lehacia (yielding typical syntactic errors in production, such as * I suggested to go) - but suggest in the sense of 'indicate, imply' is rendered by a distinct verb lirmoz, also meaning 'to hint'

It seems to me that this is an area where contrastive analysis might be of theoretical interest, too, given the little we still know - or that conventional dictionaries tell us - about how to explicitly characterize what a word "means".

In sum, contrastive analysis seems a valuable tool in deciding how much to focus on what aspects of the target language, in making generalizations about its structure, and in explaining texts or constructions which might otherwise be incomprehensible. However, for such procedures to be other than ad hoc, it would seem necessary to base them on some motivated model of how different languages can be compared both in linguistic theory and in pedagogical applications. It is to these issues that the rest of this discussion will be addressed.

1.2 Towards a Linguistic Account of Contrastive Analysis

Contrastive analysis flourished in a period when, in the United States and Great Britain at all events, linguists were focusing attention on detailed descriptive prodecures rather than on explanation. Such attitudes were reflected in

contrastive studies, too - and these generally took the form of detailed listings of differences between the two languages, classified along such dimensions as the following: a) L_2 makes more "distinctions" than L_1 - for instance, the 2nd person pronouns of Hebrew are differentiated by number and gender, unlike English "you"; English distinguishes between demonstratives in terms of proximity/remoteness, whereas this distinction is blurred in colloquial Hebrew usage of ze in the sense of both 'this' and 'that'; b) L_2 has a form with no parallel at all in L_1 - for instance, until recently Hebrew had no word equivalent to English "sophisticated" or "escalate"; Hebrew has no indefinite article - in fact, another facet of (a), since Hebrew fails to distinguish "a" and "one" except by the zero/"one" contrast; Hebrew has "no" durative aspect or verb particles; English has "no" verb-conjugation patterns corresponding to the Hebrew binyan system; or (c) the two languages express certain grammatical categories in different ways, dividing up and categorizing differently - for instance, all Hebrew nouns are marked for either masculine or feminine gender (again, in a sense, an instance of (a) above); Hebrew uses specific binyan verb-patterns to mark passive constructions where English uses "be" and the past participle; Hebrew uses še- 'that' plus a possessive form in relative clauses where English uses "whose", etc.

These, then, are examples of the kind of "sober taxonomy" advocated by descriptive linguistics[8] and performed by most practitioners of contrastive analysis in the past. As against this, we would suggest the following twofold requirement in the area: i) that what languages have in common is no less important or enlightening than the ways in which they differ; and ii) not only must we consider where and how two languages are alike or different, but why - can these points of contrast be explained in some more general, motivated, and systematic way, in other words ?

The first claim is that any explanatory and, ultimately, pedagogically helpful contrastive analysis needs to consider what properties are shared by the two languages. Thus, for instance, both Hebrew and English form their passive in basically identical ways - the underlying Direct Object being advanced to Subject status and the underlying Subject being demoted to a "chômeur" (in the sense of Perlmutter & Postal 1977) with essentially the same surface word order being manifested in the two languages; although English question-formation differs from that of Hebrew and other languages in terms of its Subject-Auxiliary inversion process, both Hebrew and English place the question-word initially; and relative clauses follow the head NP in both languages, and can be formed on Subjects, Direct, Indirect, and Oblique Objects as well as on Genitives in Hebrew as in English.

On the other hand, these common properties cannot be pushed too far. Thus, while Hebrew has a highly productive mechanism for creating passive constructions corresponding very directly to the

surface syntactic form of English passives, the following differences must be noted: a) while English passivized verbs take the form of be+Past Participle, their Hebrew counterparts are manifested by special morphological forms based on one or other of the passive verb-patterns (known as binyan conjugations) of the language; b) in Hebrew, only verbs taking a direct Object can be passivized, so that passive-formation is more restricted than in English, which allows such constructions as: the boy was laughed at, a procedure must be decided on, those beds have been slept in, etc.; and c), in actual usage, Hebrew will often prefer an impersonal third-person plural construction with no overt Subject in instances where English will more naturally resort to the passive, thus:

(5) (i) a. A new bridge is being constructed there.

b. bonim šam gešer xadaš
build (Plural) there (a) new bridge
'They (nonreferential) are building a new bridge there'

(ii) a. The results will be announced shortly.

bekarov yodi'u et hatoca'ot
soon will announce (Plural) ACC the results
'They're going to announce the results soon'

However, the differences noted above are not mere incidental items to be "listed". Rather - and this is the main thesis of the present discussion - they reflect systematic properties of the two languages, and as such systematic differences between them. Thus, with respect to point a) above, not only Passives in Hebrew, but a wide range of predication-types - e.g. transitives vs. intransitives, causative, inchoative, and reflexive - are regularly expressed through specific verb-pattern forms, whereas English typically uses such devices as auxiliaries and/or word order to express such notions; as for point b), in Hebrew verbs taking indirect or Oblique Objects cannot be passivized owing to a very general constraint disallowing "orphan" or "dangling" prepositions in the language (and hence preventing the formation of constructions of the form of English "was laughed at", etc.); moreover, point c), as illustrated in (5) above, regarding the Hebrew preference for impersonal constructions where overt agent mention is avoided, provides Hebrew with a way of "demoting" subjects of predicates like "laugh at", "decide on", etc., as follows:

(6) (i) a. The boy was laughed at

b. caxaku me hayeled
laughed (Plur) from=at the boy

(ii) a. A procedure will be decided on

b. yaxlity al nohal
will decide(Plur) about (a)procedure

Moreover, the (b) examples of (5) and (6) above are possible in Hebrew just because of another very general property of the language which, again, sets it apart from English syntactic patterning: Hebrew has a variety of constructions in which no overt subject is manifested - very generally with some kind of "impersonal" impact - whereas English is constrained by its nonallowance of subjectless sentences, with the exception of imperatives.

Similar explanations can be offered with respect to how question-formation in the two languages corresponds in very general ways, English being different, and peculiar, in its Subject-Auxiliary Inversion mechanism in such constructions; for instance, surface-form interrogatives in both languages are used with the speech-act force of requests in, say, "Could you give me a light?" or of suggestions as in "Will you take out the garbage?". We noted above that English and Hebrew relative-clause formation is very similar with respect to the ordering of head noun and modifying clause and with respect to the types of NP's which can be relativized upon. In line with our general claim, the way in which relative clauses differ in the two languages can be attributed to quite systematic differences in various aspects of their syntactic patterning. Thus: English distinguishes who/which, where Hebrew uses the single marker še- 'that' throughout. This in turn is related to the fact that the feature of Human/Nonhuman is more crucial in English grammar in general - as reflected in the paradigm of he/she/it and in certain traditional constraints on the use of apostrophe 's in possessives, inter alia; in Hebrew, it is more important to know whether a noun is masculine or feminine rather than whether it is human or not - for purposes of pronominalization, agreement, and other syntactic processes. Moreover, English who and which are relative pronouns in the accepted sense - replacing a deleted or repeated noun phrase; Hebrew has no such markers, and hence - perhaps because of this - it has pronominal copying in relative clauses (as noted earlier, yielding še- 'that' + Genitive Noun instead of whose + Noun); but this again is related to the fact that Hebrew in general manifests pronominal copying far more widely than does English, where quite typically repeated lexical material can be deleted altogether (as described in Berman 1978) - and the requirement of a pronominal copy in relatives in Hebrew is further motivated by the language's disallowance of nonattached or dangling prepositions, as noted earlier.

In other words, the similarities between the relative clauses illustrated below for the two languages are striking; the differences between them are accounted for in a motivated way by

quite general properties of each language in turn:

(7) (i) a. the boy who Dan gave the picture to

b. hayeled še dan natan lo et hatmuna
the boy that Dan gave to-him ACC the picture

(ii) a. the girl whose dress got torn

b. hayalda še simlata nikre'a
the girl that dress-her got torn

What we are arguing, then, is that contrastive analysis should try to offer an explanation for points of contrast between two languages - an explanation based upon a systematic characterization of their properties and of what is typical, and hence to be expected, of each one in terms of its overall, more general traits. Below we suggest a tentative model for language comparison which might begin to meet this requirement.

2. A Model for Comparing Languages

We suggest five points of departure for comparing two or more languages, where (i) the languages in question are not genetically related - that is, they do not share certain properties common to all (and perhaps only) members of a given family or sub-branch of languages; and (ii) it is assumed that features which are shared by languages are no less important for contrastive purposes than are their differences. We can try to compare languages along the following parameters:

(8) A. 1) Obligatory similarities
2) Chance (nongenetic) similarities
B. 3) Genetic differences
4) Systematic nongenetic differences
5) Idiosyncratic differences

Below we attempt to explain and motivate these five types of contrastive properties by reference to English and Modern Hebrew, and to consider how they may be relevant to linguistic theory and language pedagogy.

2.1 Obligatory Similarities

These are properties shared by any and all languages by virtue of the fact that they are members of the overall class of (known) natural languages. Here, then, we are concerned with "language universals" - specifically with the kind of properties described by Chomsky 1965 as "substantive universals" (rather than universals of the formal kind) or with what Keenan has

referred to as "universals in the naive sense"[5].

Such properties include the fact that all human languages evidently have ways of: making and denying certain assertions (i.e., of making affirmative and negative statements), asking questions, expressing conditions, making existential statements, and differentiating between declarative and imperative statements.

Phonologically, all languages have two major classes of segments, vowels and consonants, drawn from a single set of possible speech sounds, which in turn are organized into syllables and words - the latter in itself a noteworthy linguistic universal. Other kinds of categories which one would expect to find in all and only human languages - hence in Hebrew and English, too - include: some kind of morphologically independent personal pronouns and demonstratives, where the latter may serve as only adjectives or as pronouns or both. All languages evidently have some kind of nominal constructions for referring to what Lyons 1969 terms "first-order substantives", that is, concrete, countable objects like kinds of fruit and parts of the body or pieces of furniture, as well as well as for elements in nature (e.g. water, tree). All languages also have some sort of address terms, kin terms, and color terms; and they all evidently have idioms - complex expressions whose meaning is not compounded of the meaning of their individual parts - and, possibly, metaphors as well.

Moreover, following Keenan (see fn. 5), it appears that all languages can be characterized not only as having a finite number of primitive elements and an unbounded or infinite number of sentences, but also that they all contain constructions which exhibit restrictions on the order of their elements, have complex expressions whose meaning is in some sense composed of the meaning of their parts, and that all languages allow some sort of movement of elements.

What might the significance of such "naive universals" be from the point of view of the present discussion?

a) In strictly theoretical terms, it is interesting to consider why all languages express such notions or contain such constructions and constraints, and what this might indicate about the nature and scope of the human mind and of human linguistic dispositions.

b) In linguistic description, such properties would seem to have a very special status - and interesting research might focus on the precise devices used by different languages and groups of languages to express just these notions and categories or processes[6].

c) In psycholinguistic terms, it is evidently the case that these notions and devices are what the child must acquire in order to be a speaker of a human language. They clearly have some kind of theoretical priority with respect to the issue of how much and what part of the child's cognitive-linguistic knowledge is innate. They might also provide a fruitful avenue for analysis in developmental terms of different children acquiring a

given language, as well as for comparison of what is prior in child speech across languages.

From the point of view of language pedagogy, someone who already knows a language does not have to acquire such notions "from scratch", he does not have to discover for himself that meanings are encoded in words and sentences, that there is a difference between making statements and asking questions about things, that one can address people, that one can use pronouns to refer to speakers, hearers, and other people, etc. He already knows all this by the time he encounters a new or second language - so that the burden of what he needs to learn about these universal features is what specific manifestation they have in the new language, and not the underlying concepts at all.

2.2 Chance Similarities

This heading refers to properties which two languages share "by chance", so to speak: similarities which cannot be explained either genetically, as a property of all or only members of a related group of languages with a common ancestor, or universally, in the terms noted in 2.1 above. Below we illustrate this situation by reference to ways in which English and Hebrew, two genetically unrelated languages, happen to be alike.

- Of the three main types of word-order relations - SOV, SVO, Verb-initial - both English and Modern Hebrew happen to be basically verb-medial languages, with an SVO order, as in:

(9) (i) dan daxaf et rina
Dan pushed OM Rina (OM = the object marker et)

(ii) kol habegadim crixim nikuy
all the clothes need cleaning

(iii) hem yitnu li bekarov tšuva
they will give to me soon (an)answer

- Grammatical relations in both languages are indicated by prepositions rather than by inflectional or postpositional case-markers (as in Old English or Classical Arabic, for instance). It thus follows that a single case-marker is attached to the entire noun phrase - if at all- with no agreement in case-marking between the different elements of the noun phrase. Moreover, both languages are of the accusative rather than the ergative type, thus:

(10) (i) dan paras le rina et halexem ba sakin šelo
Dan sliced for Rina OM the bread with knife his - his knife

11

(11) hem lakxu itam mixtavim la menahel šelahem
they took with them letters to boss their =
their boss

Moreover, in both Hebrew and English, pronouns are the only elements which change form in accordance with grammatical function, as shown in (10-11): compare

hem-itam-šelahem 'they-with them-their(s)'.

- In the pronominal system, both Hebrew and English have personal pronouns which take a different form from the demonstratives, but the latter take the same form as pronouns and when used adjectivally, thus:

(11) (i) ma ze? ele šayaxim li
What('s) this? Those belong to me

(ii) sefer ze šarim ele
book this='this book' books those='those books'

Moreover, both languages have reflexive pronouns - as in (12-i) - which are also used to express emphasis on the nominal, as in (12-ii):

(12) (i) hu marax oto / et acmo be šemen
he spread him / himself with oil

(ii) dan acmo hoda bexax
Dan himself admitted to it

- Both languages use the same prepositional to express the three categories of adverbial marker of direction towards, infinitival complementizer on verbs, and marker of dative case (the same form also being used to indicate benefactive in Hebrew, where English has an overt distinction between to and for). Thus:

(13) (i) dan nasa le xeyfa
Dan went to Haifa

(ii) dan hitxil ledaber
Dan began to talk

(iii) dan natan matanā le rina
Dan gave (a) gift to Rina

Many more ways in which the two languages pattern similarly could be noted, e.g. that both place question-words initially, that relative clauses follow the head noun in both (see

Section 1.2 above), both form noun compounds by stringing two nouns together and also have a genitive particle šel or 'of', both have a three-way tense system of Present, Past, and Future, etc. Such shared features - especially in cases where Modern Hebrew differs from the forms it manifested at earlier stages of its development - present a rather peculiar problem from the point of view of linguistic typology: So much of contemporary Hebrew syntax and lexical usage is directly due to foreign influence - largely of Yiddish and, more recently, English - that there is in a sense some kind of "pseudo-genetic" relationship between Modern Hebrew and the European languages with which it has come into intensified contact for extra-linguistic reasons (the revival of Modern Hebrew by Jews of European, mainly Russian and Yiddish-speaking extraction; the emergence of Hebrew as a national language in an immigrant society; and the influence of a western orientation of this society in culture and technology, etc.). Such developments tend to blur any strict Semitic/Germanic typologizing when comparing Modern Hebrew and English. Nonetheless, the similarities revealed synchronically might be of interest for such reasons as the following:

a) In theoretical terms, they might provide some pointers as to the general direction of language change. For instance, The loosening-up of bound morphology in a more analytic direction for Modern Hebrew is an instance of a well-documented trend for richly inflected languages, a trend which would lead one to predict, for instance, increased use of the particle šel 'of' in preference to bound-form genitives; non-incorporation of accusative pronominals within the verb; and use of separate pronominals and auxiliaries rather than internal word-morphology in the expression of reflexives, inchoatives, reciprocals and causatives - all areas in which Modern Hebrew has, in fact, become more "European-looking" (for details, see Berman to appear-b). Then, too, comparisons of the kind attempted in this section provide a good basis for prediction of language-internal structuring; for instance, both because of its basic SVO word-order and because of the ordering of elements within the noun phrase in Modern Hebrew (head-noun first, modifiers and adjuncts following), one would expect relative clauses to be postnominal - as, in fact, they are. Besides Modern Hebrew and English provide a peculiarly interesting case of a "languages in contact" situation, with all that this implies for a theory of linguistic typology.

b) In language pedagogy, it would seem that the kind of similarities illustrated above should be taken advantage of as follows: (i) In ordering a course of study, such constructions might be introduced relatively early, even if in absolute terms they seem to be complex. (ii) Such common features should be stressed so as to give second-language learners a sense of psychological security, to make them "feel more at home" in the new language. And (iii) these features should be exploited in encouraging creativity in the target language, for it is here that

it is both easiest and "safest" for students to apply rules they already know from their own language.

2.3 Genetic Differences

Here we consider ways in which the two languages differ by virtue of their being members of different language families. Thus, with respect to English:

- As a Germanic language, it displays a wide range of adverbial particles - often identical to prepositions in their surface shape - to yield a rich system of "two-word verbs" such as sit down, go out, leave off, finish up.

- As is to be expected, English is a habere language with a separate, distinct set of forms meaning 'to be' and 'to have' respectively (though these are semantically related, as in "There is a book on the table" and "The table has a book on it"). Related to this is the fact that English has no special existential particle which corresponds to Hebrew yeš or Turkish var, each with its own negative counterpart.

- Like other Germanic - and to a lesser extent Romance - languages, and related to its having both a 'be' and a 'have' verb, English makes wide use of auxiliary verbs to express Aspect, Mood, Voice and also in Causative and Inchoative constructions.

By contrast, Hebrew manifests such typically Semitic features as the following:

- Its phonological system includes low or "guttural" consonants. While these are not phonetically realized in most contemporary speech, they do have a phonological effect on their environment, typically by lowering contiguous vowels, as in leʔexol 'to eat' vs. the paradigmatic liCCoC of ligmor 'to finish' or xatifa / hatifa/ 'seizing' vs. the basic CCiCa gmira 'finishing'.

- The root-based nature of the Hebrew lexicon yields a clearly definable set of morphological patterns for nearly all content-words, which are characterizable in terms of Root + Affixes, with the root being a clear semantic prime.

- Related to this is the relatively high predictability of vowel patterning in Hebrew words, which makes it possible for the language to use a writing system with no overt vowel marking.

- Part of the same system of Semitic properties is the peculiar duality of the verbal compared with the nonverbal apparatus of the language in morphological terms, verbs all being constructed

within a very restricted set of binyan patterns - with the result that loan-words may retain a foreign morpheme-structure in nouns and adjectives, but not in verbs. Compare:

(14) Borrowed Nouns and Adjcetives	Related Verbs
filosófia, filosof	hitpalséf 'philosophized'
basis	bísés 'based' (Trans.)
	hitbasés 'was based'
katalog	kitlég 'catalogued'
simpáti, simpátia	simpét 'liked'
télefon	tilpen 'telephoned'

- Such categories as Voice, Transitivity, Causative, Reciprocal, Inchoative are typically lexicalized within the verb system through alternations in the binyan pattern of a given verb-root - that is, throgh verb morphology rather than by any of the more analytic devices noted earlier for English.

Such genetically based differences between groups of languages underlie much of the work in traditional historico-comparative linguistic analysis and reconstruction. They have also been focused on in recent syntactically oriented studies in universal grammar with respect, for instance, to constructions like relative clauses and passives (see references to Keenan, Keenan & Comrie, Perlmutter & Postal). We would further like to suggest:

a) That they form the basis for a more extensive theoretically oriented linguistic typology along the following two lines: (i) relevant categories - such as passives, interrogatives, lexical borrowing, lexical innovation - might be isolated and compared to see how they are manifested in a given subset of languages, hence yielding a more detailed and precise typology for each construction or process; and (ii) a given subset of languages might be examined to ascertain what properties they share among themselves alone.

b) In language pedagogy, an obvious yet still necessary distinction must be made in terms of the students' source language. If they have a related L_1, contrasts of the kind noted in this section are not relevant; rather, they will approach the new language with a wider spectrum of shared and hence expected knowledge of the kind discussed in 2.2 above. If student have a noncognate first language, then the features noted here represent for them unmotivated or inexplicable differences. From their point of view, in fact, features of the target language which are predictable in terms of its genetic character are exactly analagous to the next type of difference we consider in Section 2.4 below - differences we have termed "systematic, but nongenetic in origin".

2.4. Nongenetic Systematic Differences

This section considers language features which in my opinion constitute the crux of contrastive analysis in language pedagogy.

These are differences which, while not accounted for in genetic terms, apply across the language as a whole; that is, they are properties which are quite general, typical features of one of the languages in question but not of the other. Below we list a few illustrative phenomena, divided up according to aspect of linguistic structure.

Phonology: The vowel system of English manifests a regular set of tense/lax distinctions which have definite implications with regard to pronunciation (e.g. gliding of tense vowels), word-stress (e.g. what constitutes a strong syllable or cluster), and vowel-reduction; Modern English further shows the effect of earlier vowel-shifting, manifested in the orthography of such wellknown derivatives as explain-explanatory, meter-metrical, and line-linear; and initial consonant clustering is severely constrained in English in terms of relative sonority, with voicing, liquids, and the spirant s playing a characteristic role.

Hebrew, by contrast, has wide-spread voicing assimilation at the phonetic level; has no word-final consonant clusters (except before the past tense feminine suffix -t); disallows triconsonantal medial clusters; and has basically word-final stress - the few exceptions, such as the segolate class of nouns (e.g. yéled 'boy', berez 'tap' téken 'standard') and certain weak suffixes, being clearly specifiable.

Lexicon: The English lexicon consists of two major classes of words: those of Germanic stock, which include the commonest, most everyday words, nearly all monosyllabic words in the language, the verbs and nouns taking irregular inflectional forms in past and plural, the so-called "two-word verb" combinations often idiomatic Verb+Particle or Verb+Preposition, the verbs which undergo dative shifting, etc.; and words of Romance or Greek extraction - to which velar softening applies, which account for the polysyllabic and more learned items of the lexicon, which manifest complex derivational morphology, etc. Words borrowed into the language at earlier stages of its history pattern according to native English morphophonological variations (e.g. the palatalization and vowel-laxing and reduction of a set such as native-nature-natural all from the same Latin stem), while recent borrowings may be given a non-English pronunciation (as in tsetse or garage pronounced with a final ž).

The lexicon of Modern Hebrew, on the other hand, is taken over from both the classical biblical vocabulary and that of later Mishnaic and Medieval sources; this accounts for numerous pairs of synonyms which differ mainly in level of style, e.g. ec/ilan 'tree', aval/ulam 'but', ata/axšav 'now' - but untutored speakers do not have any sense of what stage in the history of their language a given word may have come from.

whereas English speakers do, it seems to us, have an intuitive sense of the "short and simple" or"everyday" words in their language compared with those of Latinate origin. Loan-words in Hebrew, both of earlier and more recent innovation, manifest the duality noted in (14) above - verbs assigned to native morphological patterns in all cases, other words retaining a foreign form or structure.

Morphology: English has a highly complex derivational morphology, as noted earlier, but retains few inflections: all suffixal - with -s, -z, and -ɨz alternating to form the 3rd person marker on verbs and plural and possessive of nouns, following voicing and assimilation processes analagous to the -t, -d, -ɨd alternation in the past tense of verbs. Hebrew, on the other hand, has a richly variegated set of inflectional prefixes, suffixes, and infixes attaching to triconsonantal roots to express a wide range of grammatical categories in verbs, nouns, adjectives, and prepositions (See Berman in press, Section 3.2).

Syntax: 1) With respect to overall sentence-structure, English sentences - with the exception of imperatives - must have an overt grammatical subject, involving in several cases the use of such pro-subjects as it and there. Hebrew typically has a number of different subjectless constructions - including impersonal plural-verb sentences like those in (5) above; existential propositions; and predicates taking extraposed sentential subjects where English would require an "empty" it as in It's good that he came, It was hard to convince him.

2) In word-order, noun modifiers (except for quantifiers) invariably follow the head-noun in Hebrew, whereas in English the case is typically mixed (cf. John's uncle / an uncle of John's), compare:

(15) Eng: that big, black wine-bottle/ bottle of wine which we drank (from)

Heb: bakbuk yayin gadol ve šaxor ze še šatinu (mimenu)
bottle of wine big and black this that we drank (from it)
for

With the sole exception of an indirect object fronted by dative shifting (and hence "advanced" or "promoted" to direct object status), English normally disallows any elements between the verb and its direct object - but Hebrew is far freer in this respect, and can have indirect objects or various adverbials directly after a transitive verb. Moreover, where the preferred order for adverbial modifiers is Place then Time in English, the reverse holds for Hebrew.

3) We noted earlier that both languages take prepositional case markers: in Hebrew, some of these are enclitically

affixed to the noun - in keeping with the more bound nature of its morphology in general. In English, both subjects and direct objects have zero case-marking, but in Hebrew (as in other languages, such as Hindi) the direct object takes a preposition just in case it is definite.

4) With regard to tense-marking, English verbs take suffixes in Present (3rd Person) and Past Tense, the Future being allied with the modal system both formally and semantically (in that will has both a root and an epistemic sense, for instance). In Hebrew, the inflectionally marked tenses are Past and Future (corresponding to perfective and imperfective aspect respectively in classical Hebrew) while the Present Tense reveals its nominal origins in being inflected for Number and Gender, not for Person. As a result, only Present Tense verbs require overt mention of a distinct subject pronoun throughout.

5) Gender is largely "natural" in English, and is arbitrarily divided up between masculine and feminine for all non-animate nouns in Hebrew.

6) Both languages manifest Subject-Verb agreement, but in Hebrew this includes Gender - as is implied by 5) above - and Person, too. Moreover, within the NP, demonstratives and adjectives agree with the head noun in Hebrew for Number, Gender, and Definiteness.

7) As noted earlier, Hebrew disallows dangling prepositions so that some other device is necessary to handle cases like English the man I traveled with, Who can I leave this with? or They will be taken with. This in turn explains why, as noted before, Hebrew requires a pronominal copy in relative clauses, why it does not form passives on verbs taking indirect or oblique objects, and why prepositions must be fronted in questions.

The above points, like those in the preceding sections, are no more than illustrative, and make no claims to having covered most, or the most important, aspects of structure in the two languages. It follows that more thorough examination is needed in order to meet the requirements set at the beginning of this discussion - of explaining such features in terms of general characteristics of the language as a whole. Yet these few points should demonstrate the significance of the notion "systematic differences between languages", from the following points of view at least.

a) Examination of such language-specific properties as carry across the language as a whole might form the basis for an important and relatively neglected area of study - one which in another context I termed "contrastive stylistics" (Berman 1978), in the sense of the rhetorical devices typical of discourse in a given language. Thus, for example, the phenomenon of gapping in English is related to the very general trend of the language to

avoid lexical repetition at all costs - either by total deletion, or by pronominalization, or by lexical paraphrase - in that order of preference. Hebrew, on the other hand, approves of lexical repetition as a definite rhetorical device and, where necessary, will avoid it by pronominalization rather than by paraphrase or gapping.

b) It further seems that this way of looking at languages can provide the kind of internal linguistic evidence necessary for achieving explanatory adequacy in grammatical description. For instance, to the highly motivated notion of a hierarchy of Noun Phrase accessibility as suggested by Keenan & Comrie 1972 we can add Hebrew *et* as a direct-object marker which shares properties of both zero marking on Subjects and other prepositional markings on Objects and hence lends a kind of medial status to Direct Objects as compared with Subjects and other NP's respectively - both in syntactic patterning and in semantic force (See Berman in press, Chapter 4).

c) In language pedagogy - including, perhaps, a more analytical type of first language study, too - properties of the target language such as those noted in this section for Hebrew and English would seem crucial to the teaching process. For in order for students to be able to achieve creativity in a language, to really understand and use it confidently, they need some sense of the picture as a whole, over and above the isolated, hence often senseless bits and pieces they get as they go along in the course of study. It seems clear that the language learner - especially at the more advanced level - stands to benefit from truly general generalizations about the language he is learning, whatever terms these generalizations happen to be couched in. That is, true proficiency in learning a language must include the knowledge - whether explicit or not - of the most general properties characterizing the target language; not so much for fear of "interference" from the mother tongue, but for more positive and constructive reasons, so that the student gets a feel for what his new language is all about and how in fact it works.

2.5. Idiosyncratic Differences

These are odd bits and pieces of information about a language that the native speaker always seems to know, the foreigner rarely if ever. This is the kind of non-rule bound knowledge which cannot be related to any systematic property or set of properties of a given language, but which needs to be memorized ad hoc. A few examples will show what is meant here.

1) Hebrew expresses many syntactic categories through inflections, but the comparative takes an analytic form by chance, with the words (yoter)... mi '(more)... from=than' as in ani ohev et dan yoter mi david ' I like OM Dan more than David' with the same ambiguity as in English). English comparatives, however, take a mixed form, part morphological and part similar

to the Hebrew - though English uses the unique marker *than* rather than ablative 'from' throughout. And it is hard to say which bisyllabic words in English take the one form, or either of them, in comparisons.

2) Both English and Hebrew make a distinction between *count* and *noncount nouns* - although this distinction has more significance for choice of determiner in English than in Hebrew. *(how) much/ (how)many, (a)little / (a) few*, etc.being far less differentiated in the latter. However, apart from the general tendency of Hebrew to allow more countability with nouns referring to substances (e.g. the Hebrew words for *iron, chalk, paper* - the material - and *money* are countable), there seems no reason why *advice* and *furniture* should be noncount in English but not in Hebrew, or why *xayim* 'life' and *mayim* 'water' are plural in form and agreement in Hebrew. Similarly, semantic alternations between mass nouns and their countable homophones in English are often unpredictable (e.g. *glass, paper, iron, company*).

3) The *definite marker* ha- of Hebrew functions semantically in a way closely corresponding to English 'the' in most instances. However, Hebrew noncount nouns used with a generic sense - like those in many languages - can typically occur with this same definite marker, yielding such ungrammatical sentences as the following in the English of Hebrew-speakers: * *The life is hard*, * *He is describing the nature*.

Other examples of idiosyncracies - sometimes but not necessarily historically accountable - concern what particular morphological pattern is associated with a certain set of words, with agent nouns and abstract nouns being a typical case for both English and Hebrew (cf. *sailor, author, professor* and *nurse* or *refusal, allowance, permission, agreement* respectively). And it is often not clear what kinds of morphological suppletion can be expected - as in the paradigm for English *be* or *go* vs. *went*, or the fact that the feminine of *xamor* 'donkey' is the productive *xamora* only with respect to people, the animal being termed *aton* 'she-donkey'.

Such examples suggest the following:

a) Idiosyncratic properties fall largely in the area of the lexicon, as is to be expected, and they need to be stored in the memory as isolated, individual pieces of information. They also seem more typical of morphological structures than of syntax - with regard to the languages considered here, at all events.

b) Many, if not all of these anomalies have historical sources - e.g. the suppletive forms of *be* in English, its irregular plurals and past-tense forms, etc. But they cannot be said to have any psychological reality for the learner, whether native or foreign - being acquired as incidental facts.

It thus follows that in language pedagogy, as in linguistic description, they must be accorded the status of true "exceptions" and hence can only be listed, not accounted for. Hence, too, the relatively minor importance which should be

delegated to such items in both the theory and pedagogy of a given language.

3. Summary

This discussion has tried to motivate the following claims:

a) Contrastive analysis can and should be a significant field of research in both linguistic theory and language pedagogy - though for different reasons and in different ways, given that the two are totally different areas of inquiry, with different aims and motivations - and hence with different methods.

b) In order for contrastive analysis to be a rewarding field of endeavor, a solid theory of contrastive analysis is needed, specifying how and along what dimensions languages can best be compared with one another.

c) This, in turn, needs to be anchored in an adequate theory of universal grammar - along the lines now being suggested by linguists such as Keenan (see fn. 5), Comrie, Li and Thompson, departing somewhat from the "classic" generative requirements of Chomsky 1965 and the quantification of Greenberg 1963, 1965.

d) A worthwhile aim would be to establish a "hierarchy of significance" - not in psychological terms of what is more difficult for the learner from the point of view of "transfer" or "interference" - too little is as yet known of this, even though these notions are in themselves important for learning theory. Rather, significance might be characterized in terms of the relevance of a particular property or phenomenon to the language in question, to its own overall internal structure and operation as a language. This would seem of value both for explanation in linguistic analysis and for the choices made by a person learning a new language.

It is hoped that these remarks may indicate ways of reinforcing the relevance of linguistics to language pedagogy, and of language pedagogy to linguistics; for many of the ideas set down here derive in part at least from personal experience in language learning - as a speaker of English studying Hebrew, and as a teacher of English to students whose native tongue is Hebrew.

NOTES

* This is an extended and revised version of a paper read at the Seventh World Congress of Jewish Studies held in Jerusalem, August 1977. I am grateful to Elite Olshtain, Jacquelyn Schachter, and Paul Wexler for having taken the trouble to read and comment on an earlier version of this article.

1. This is a semantic problem no less than a syntactic one. For instnace, Hebrew not only lacks a main verb parallel to "have" or avoir, it has no single verb counterparts for such related notions as "own" or "possess", either.

2. The term "explicit teaching" is due to Krashen & Seliger 1975. See Berman, to appear, for further explanation of this point of view.

3. A detailed account of the syntactic functioning of semi-nominal present tense and participial benoni constructions in Modern Hebrew is provided in Berman, in press, Chapter 5.

4. The term is due to Joos 1963, page 96, where the editor criticizes Trubetzkoyan phonology for "offering too much of a (phonological) explanation where a sober taxonomy would do as well".

5. This term was used by Edward L.Keenan in a course entitled "Universal Grammar" given at Tel Aviv University in spring 1977. The present discussion is greatly indebted to the stimulation afforded me by Keenan's way of looking at human languages as expressed in the above context as well as in his detailed analysis of different languages and the implications this has for a formal theory of universal grammar (for instance, Keenan 1976, Keenan and Comrie 1972, Gary and Keenan 1977). Any inadequacies in the model proposed in the present discussion, whether theoretical or factual, are of course due directly and solely to the author.

6. For instance, such universal might be given "top listing", so to speak, in individual language studies of the kind elicited by the questionnaire published in the Lingua Descriptive Studies series, Lingua 42, 1, 1977.

REFERENCES

Berman, Ruth Aronson, 1978. Postposing, lexical repetition, and the like: a study in contrastive stylistics. Journal of Applied Linguistics (Israel), 2

--------, in press. Modern Hebrew Structure. Tel Aviv: Universities Publishing Projects

--------, to appear - a. Rule of grammar or rule of thumb? International Review of Applied Linguistics

--------, To appear - b. Lexical decomposition and lexical unity in the expression of Aktionsarten in Modern Hebrew. Journal of Afroasiatic Linguistics

Chomsky, Noam 1965. Aspects of the Theory of Syntax. Cambridge, Mass: M.I.T. Press

Gary, Judith Olmsted and Edward L. Keenan, 1977. On collapsing grammatical relations in universal grammar. In: Peter Cole & Jerrold M. Sadock, eds. Syntax and Semantics 8: Grammatical Relations. New York: Academic Press. 83-120.

Greenberg, Joseph, 1963, ed. Universals of Language.Cambridge, Mass: M.I.T. Press

--------, 1965. Language Universals. The Hague: Mouton

Joos, Martin, 1968, ed. Readings in Linguistics.New York: American Council of Learned Societies

Keenan, Edward L. 1976. Towards a universal definition of subject. In: Charles N. Li, ed. Subject and Topic. New York: Academic Press

Keenan, Edward L. and Bernard Comrie, 1972. Noun-phrase accessibility and universal grammar. Presented to the 1972 Annual Meeting, Linguistic Society of America; to appear in Linguistic Inquiry

Krashen, Stephen D. & Herbert W. Seliger, 1975. The essential contribution of formal instruction in adult second language learning. TESOL Quarterly 9, 2

Li, Charles N., 1974, ed. Word Order and Word Order Change. Austin: University of Texas

-------- & Sandra A. Thompson, 1976. Subject and topic: A new typology of language. In: Subject and Topic. New York: Academic Press

Lyons, John, 1969. Introduction to Theoretical Linguistics. London: Cambridge University Press

Postal, Paul M. and David Perlmutter, 1977. Toward a universal characterization of passivization. Unpublished manuscript

Schacter, Jacqueiyn, 1974. An error in error analysis. Language Learning 24,2